

What is Claimed:

- 1                   1.     A method of packaging a semiconductor device, the  
2     method comprising the steps of:  
  
3                   applying an insulative material across only a portion of at  
4     least two of a plurality of conductors providing interconnection between  
5     elements in the semiconductor device; and  
  
6                   encapsulating the conductors and elements, thereby  
7     packaging the semiconductor device.
- 1                   2.     The method of claim 1 further comprising the step of:  
  
2                   curing the insulative material after said applying step.
- 1                   3.     The method of claim 2 wherein said curing step  
2     includes at least one of heating the insulative material and exposing the  
3     insulative material to UV radiation.
- 1                   4.     The method of claim 1 wherein said applying step  
2     includes applying an insulative compound comprising spherical silica  
3     particles to the portion of a plurality of conductors.
- 1                   5.     The method of claim 4 wherein the insulative  
2     compound is applied in a substantially circumferential manner about an  
3     inner element of the semiconductor device.
- 1                   6.     The method of claim 4 wherein the insulative  
2     compound is applied in at least two geometric shape structures, each of  
3     the geometric shape structures substantially surrounding an inner element  
4     of the semiconductor device in a circumferential manner.
- 1                   7.     The method of claim 1 wherein said applying step  
2     includes applying a solid insulator having an adhesive backing to the

3 portion of a plurality of conductors such that the adhesive backing is in  
4 contact with the portion of a plurality of conductors.

1 8. The method of claim 1 wherein said applying step  
2 includes applying an insulative tape to the portion of a plurality of  
3 conductors.

1 9. The method of claim 1 wherein said applying step  
2 includes applying a continuous bead of the insulative material across only  
3 a portion of at least two of a plurality of conductors providing  
4 interconnection between elements in the semiconductor device.

1 10. The method of claim 1 wherein said applying step  
2 includes applying the insulative material around a peripheral portion of an  
3 inner element of the semiconductor device.

1 11. The method of claim 1 wherein said applying step  
2 includes applying the insulative material in at least two distinct structures  
3 around a peripheral portion of an inner element of the semiconductor  
4 device, the two structures not being in contact with one another.

1 12. A semiconductor device comprising:

2 a plurality of semiconductor elements;

3 a plurality of conductors providing interconnection between  
4 said plurality of semiconductor elements; and

5 an insulative material applied across only a portion of at least  
6 two of said plurality of conductors.

1 13. The semiconductor device of claim 12 further  
2 comprising an encapsulation layer encapsulating said conductors and  
3 elements for packaging said semiconductor device.

1                   14.    The semiconductor device of claim 12 wherein said  
2 plurality of semiconductor elements includes at least one semiconductor  
3 die having a plurality of first contacts, and a lead frame having a plurality  
4 of second contacts, said plurality of conductors providing interconnection  
5 between said plurality of first contacts and said plurality of second  
6 contacts.

1                   15.    The semiconductor device of claim 14 wherein said  
2 insulative material is disposed across said portion of said at least two of  
3 said plurality of conductors adjacent said semiconductor die.

1                   16.    The semiconductor device of claim 14 wherein said  
2 insulative material is disposed across said portion of said at least two of  
3 said plurality of conductors approximately midway between said  
4 semiconductor die and said leadframe.

1                   17.    The semiconductor device of claim 12 wherein said  
2 insulative material is a curable insulative material.

1                   18.    The semiconductor device of claim 12 wherein said  
2 insulative material is at least one of a heat induced curable insulative  
3 material and a UV radiation curable insulative material.

1                   19.    The semiconductor device of claim 12 wherein said  
2 insulative material is comprised of a plurality of spherical silica particles.

1                   20.    The semiconductor device of claim 12 wherein said  
2 insulative material is applied around a peripheral portion of an inner  
3 element of said semiconductor device.

1                   21.    The semiconductor device of claim 12 wherein said  
2 insulative material is applied in at least two distinct structures around a  
3 peripheral portion of an inner element of said semiconductor device, said  
4 two structures not being in contact with one another.

1                   22.    The semiconductor device of claim 12 wherein said  
2   insulative material includes a substantially solid insulator having an  
3   adhesive component such that said adhesive component is in contact with  
4   said portion of said at least two of said plurality of conductors.

1                   23.    The semiconductor device of claim 12 wherein said  
2   insulative material is an insulative tape.